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DATE MAILED: 06/24/2004

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO	
09/989,357	11/20/2001	Thomas Lee Rodeheffer	9772-321-999	1127	
24341	7590 06/24/2004		EXAMINER		
MORGAN, LEWIS & BOCKIUS, LLP.			PUENTE, EMERSON C		
3300 HILLVIEW AVENUE PALO ALTO, CA 94304			ART UNIT	PAPER NUMBER	
THEO HETC	, ,		2113		

Please find below and/or attached an Office communication concerning this application or proceeding.



	Application	on No.	Applicant(s)				
	09/989,357		RODEHEFFER ET AL.				
Office Action Summary	Examine	•	Art Unit	1			
	Emerson	C Puente	2113				
The MAILING DATE of this commun	nication appears on the	e cover sheet with the c	orrespondence a	ddress			
A SHORTENED STATUTORY PERIOD F THE MAILING DATE OF THIS COMMUN  - Extensions of time may be available under the provision after SIX (6) MONTHS from the mailing date of this com  - If the period for reply specified above is less than thirty ( - If NO period for reply is specified above, the maximum s  - Failure to reply within the set or extended period for repl Any reply received by the Office later than three months earned patent term adjustment. See 37 CFR 1.704(b).	IICATION. s of 37 CFR 1.136(a). In no evenunication. 30) days, a reply within the state tatutory period will apply and wey will, by statute, cause the app	ent, however, may a reply be tim utory minimum of thirty (30) days ill expire SIX (6) MONTHS from lication to become ABANDONEI	nely filed s will be considered time the mailing date of this O (35 U.S.C. § 133).				
Status							
1) Responsive to communication(s) fil	ed on <u>22 June 2004</u> .						
2a) This action is <b>FINAL</b> .	2b)⊠ This action is r	on-final.					
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is							
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.							
Disposition of Claims							
4) Claim(s) 1-18 is/are pending in the	application.						
4a) Of the above claim(s) is/s	• •	nsideration.					
5)⊠ Claim(s) <u>7-18</u> is/are allowed.							
6) Claim(s) is/are rejected.							
7)⊠ Claim(s) <u>1-6</u> is/are objected to.							
8) Claim(s) are subject to restri	ction and/or election r	equirement.					
Application Papers							
9) The specification is objected to by the	ne Evaminer						
10) The drawing(s) filed on is/are		nhierted to by the l	Evaminer				
Applicant may not request that any obje							
Replacement drawing sheet(s) includin	<b>.</b> ,	•	• •	CER 1 121(d)			
11) The oath or declaration is objected to	-	= : :					
	to by the Examiner.		7.00077 07 101117	10 102.			
Priority under 35 U.S.C. § 119							
12) Acknowledgment is made of a claim	ı for foreign priority un	der 35 U.S.C. § 119(a)	-(d) or (f).				
a) All b) Some * c) None of:							
1.☐ Certified copies of the priority							
2. Certified copies of the priority							
3. Copies of the certified copies	•		ed in this Nationa	il Stage			
application from the Internati			d				
* See the attached detailed Office action	on for a list of the cert	med copies not receive	u.				
Attachment(s)							
1) Notice of References Cited (PTO-892)	DTO 040)	4) Interview Summary					
Notice of Draftsperson's Patent Drawing Review (     Information Disclosure Statement(s) (PTO-1449 o Paper No(s)/Mail Date 1/30/02.		Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:		O-152)			
U.S. Patent and Trademark Office PTOL-326 (Rev. 1-04)	Office Action Summa	nry Pa	rt of Paper No./Mail	Date 20011120			

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### **DETAILED ACTION**

Claims 1-18 have been examined

## Claim Objections

Claims 1-6 are objected to because of the following informalities:

In regards to claim 1, please swap the paragraph beginning with "access logic..." (see line 8 of claim) with the paragraph beginning with "error logic,..." (see line 12 of claim) The limitations "the error logic" and "the error detection signal" (see line 9 of claim) lack antecedent basis.

In regards to claim 4, please swap the paragraph beginning with "access logic..." (see line 11 of claim) with the paragraph beginning with "error logic,..." (see line 15 of claim) The limitations "the error logic" and "the error detection signal" (see line 12 of claim) lack antecedent basis.

The remaining claims, not specifically mentioned, are objected to because they are dependent upon one of the claims mentioned above.

Appropriate correction is required.

# Examiner's Statement of Reason for Allowance

Claims 1-6 would be allowable if rewritten to overcome the "Claim Objections" set forth above. Claims 7-18 are allowable.

The following is an Examiner's statement of reasons for the indication of allowable subject matter: Claims 1, 4, 7, 10, 13, and 16 are allowable over the prior art of record because

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the Examiner found neither prior art cited in its entirety, nor based on the prior art, found any motivation to combine any of the said prior arts.

The reason for allowance for claims 1 is the inclusion of a code array for storing error codes, including a distinct error code for each of the plurality of memory lines in conjunction with the rest of the limitation set forth in the claim.

The reason for allowance for claims 4 and 7 is the inclusion of a code array for storing error codes, including a distinct error code set for each of the plurality of memory lines, each error code set including a plurality of error codes with a distinct error code for each of the plurality of distinct portions of the associated memory line in conjunction with the rest of the limitation set forth in the claim.

The reason for allowance for claims 10 is the inclusion of maintaining a code array that includes a distinct error code for each of the plurality of memory lines in the memory array associated with the memory module in conjunction with the rest of the limitation set forth in the claim.

The reason for allowance for claims 13 is the inclusion of maintaining a code array that includes a distinct error code set for each of the plurality of memory lines in the memory array associated with the memory module, each error code set including a plurality of error codes with a distinct error code for each of the plurality of distinct portions of the associated memory line in conjunction with the rest of the limitation set forth in the claim.

The reason for allowance for claims 16 is the inclusion of maintaining a code array that includes a distinct error code set for each of the plurality of memory lines, each error code set including a plurality of error codes with a distinct error code for each of the plurality of distinct

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portions of the associated memory line in conjunction with the rest of the limitation set forth in the claim.

The remaining claims, not specifically mentioned, are allowed because they are dependent upon one of the claims mentioned above.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance.

### Conclusion

This application is in condition for allowance except for the following formal matters: See "Claim Objections" above.

Prosecution on the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

A shortened statutory period for reply to this action is set to expire **TWO MONTHS** from the mailing date of this letter.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Emerson C Puente whose telephone number is (703) 305-8012. The examiner can normally be reached on 8-5 M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robert W Beausoliel can be reached on (703) 305-9713. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 306-5631.

Emerson Puente 6/22/04

Robert BEAUSOLIEL

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